HUMBOLDT BAY MUNICIPAL WATER DISTRICT

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Website: www.hbmwd.com

CERTIFIED WATER LOSS AUDIT VALIDATION REPORT

PART A - PROVIDED BY THE VALIDATOR

Audit Information:

Water System Name: Humboldt CSD

PWS ID*: CA1210009

*List only 1 PWSID which matches the PWSID on the FWAS Instructions Tab. For special cases where multiple water systems are connected with permanent two-way interties, list additional PWSID's in the "Notes" below and describe the water distribution system configuration.

PWSID and Water System Configuration Notes (Provided to Validator by Water System):

HCSD purchases the majority of water from Humboldt Bay Municipal Water District, but also has three own-source wells.

Audit Period: Calendar 2020 <u>Validation Date:</u> 9/30/21 <u>Utility Representation:</u> Ben Adams

Sufficient Supporting Documents Provided: YES

Validation Findings & Confirmation Statement:

Key Audit Metrics:

Data Validity Score: Data Validity Band (Level): Level III

<u>ILI:</u> 2.8 <u>Real Loss:</u> 38.13 gal/conn/day <u>Apparent Loss:</u> 19.12 gal/conn/day

Non-Revenue Water as Percent of Cost of Operating System: 14.8%

Certification Statement by Validator:

This water loss audit report has been Level 1 Validated per the requirements of California Code of Regulations Title 23, Division 2, Chapter 7 and the California Water Code Section 10608.34. All recommendations on Volume Derivation and Data Validity Grades were incorporated into the water audit.

Yes

If not, rejected recommendations are included here:

Validator Information:

Water Audit Validator: Chris Harris

Validator Qualifications: Water Audit Validator Certificate issued by the CA-NV Section of the AWWA

CERTIFIED WATER LOSS AUDIT VALIDATION REPORT, CON'T

PART B - PROVIDED BY THE UTILITY/AGENCY

PWS ID*: CA1210009 **Humboldt CSD** Water System Name: *List only 1 PWSID which matches the PWSID on the FWAS Instructions Tab. For special cases where multiple water systems are connected with permanent two-way interties, the additional PWSID's should be listed in the "Notes" section by the Validator. Water Audit & Water Loss Improvement Steps: 1. Steps Taken: Water System to identify steps taken in the preceding 3-years to increase data validity, reduce real loss, and apparent loss as informed by the annual validated water audit: CY17 - Data generated by the billing system has been thoroughly analyzed, audited, and verified with field results over the prior several years to increase data accuracy. CY18 - Continued tracking monthly estimated volumes from hydrant flushing, municipal uses of water and coordinated with the Fire Department for monthly estimated water used. HCSD continued replacing old steel line, replacing 660' in CY18. HCSD continues to proactively search for potential unknown interties with a neighboring agency. CY19 - Continued efforts to better correlate water production vs. water consumption data. HCSD installed additional AMR meters this year and continues to monitor 94 installed leak sensors in the water system. CY20 - Confidence in the UB software has increased due to internal auditing, review and staffing changes. HCSD continues their efforts to better correlate water production vs. water consumption data. Again this year, additional AMR meters were installed. 2. Planned Steps (OPTIONAL): If your audit reflects negative real losses or the cost of non-revenue water is greater than 100% of the operating costs (issues for which your audit will not meet code requirements), you will be asked what steps you are planning in the coming year to address these issues. (N/A)3. Certification Statement by Utility Executive: This water loss audit report meets the requirement of California Code of Regulations, Title 23, Division 2, Chapter 7, and the California Water Code Section 10608.34 and has been prepared in accordance with the method adopted by the American Water Works Association, as contained in their

manual, Water Audit Loss Control/Programs, Manual M36, Fourth Edition and in the Free Water Audit Software version 5.

Executive Name and Position: Terrence (TK) Williams, General Manager

Executive Signature and Date